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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/903,362	07/11/2001	Felix Achille	44452A	9554
109	7590	03/04/2004	EXAMINER TRAN, THAO T	
THE DOW CHEMICAL COMPANY INTELLECTUAL PROPERTY SECTION P. O. BOX 1967 MIDLAND, MI 48641-1967			ART UNIT	PAPER NUMBER
			1711	

DATE MAILED: 03/04/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

AS

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/903,362	ACHILLE, FELIX	
	<b>Examiner</b>	<b>Art Unit</b>	
	Thao T. Tran	1711	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 18 December 2003.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-31 is/are pending in the application.
- 4a) Of the above claim(s) 12-31 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)             | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)    | Paper No(s)/Mail Date. _____  |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____   | 6) <input type="checkbox"/> Other: _____                                    |

## DETAILED ACTION

### *Response to Remarks*

1. This is in response to the Remarks received on December 18, 2003. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
2. Claims 1-32 are currently pending in this application. Claim 32 has been newly added. Claims 12-16 and 18-31 have been withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to a nonelected inventions, there being no allowable generic or linking claim. Election was made **without** traverse in Paper received on April 16, 2003.
3. Applicant's arguments, see pages 3-5, filed on December 09, 2003, with respect to the rejection of claims 1-11 and 17 under 35 U.S.C. 102(b) as being anticipated by Young, Sr. et al. (US Pat. 5,516,585) and the rejection of claims 1-7, 10 and 17 under 35 U.S.C. 102(b) as being anticipated by Tanaka et al. (US Pat. 4,966,809) have been fully considered and are persuasive. Therefore, these rejections have been withdrawn. However, upon further consideration, further Restriction Requirement and a new rejection are being made as follows.

### *Election/Restrictions*

4. Restriction to one of the following inventions is required under 35 U.S.C. 121:
  - I. Claims 1-11 and 32, drawn to a superabsorbent polymer blend composition and a method of making, classified in class 525, subclass 54.32.
  - II. Claim 17, drawn to an extruded or molded article, classified in class 442, subclass 374 or class 264, subclass 241.

Art Unit: 1711

The inventions are distinct, each from the other because of the following reasons:

5. Inventions II and I are related as mutually exclusive species in an intermediate-final product relationship. Distinctness is proven for claims in this relationship if the intermediate product is useful to make other than the final product (MPEP § 806.04(b), 3rd paragraph), and the species are patentably distinct (MPEP § 806.04(h)). In the instant case, the intermediate product is deemed to be useful as a calendared article and the inventions are deemed patentably distinct since there is nothing on this record to show them to be obvious variants. Should applicant traverse on the ground that the species are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the species to be obvious variants or clearly admit on the record that this is the case. In either instance, if the examiner finds one of the inventions anticipated by the prior art, the evidence or admission may be used in a rejection under 35 U.S.C. 103(a) of the other invention.

6. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art as shown by their different classification, restriction for examination purposes as indicated is proper.

7. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their recognized divergent subject matter, restriction for examination purposes as indicated is proper.

8. During a telephone conversation with Mr. Dan Howard on January 6, 2004 a provisional election was made with traverse to prosecute the invention of Group I, claims 1-11. Affirmation of this election must be made by applicant in replying to this Office action. Claim 17 has been

Art Unit: 1711

withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

***Claim Rejections - 35 USC § 102***

9. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

10. Claims 1-11 and 32 are rejected under 35 U.S.C. 102(b) as being anticipated by Nagata et al. (US Pat. 5,567,744).

Nagata teaches a polymer blend composition and a method of making, comprising mixing a high water-absorbent resin (superabsorbent polymer) and a thermoplastic resin (see abstract; col. 3, ln. 47-51). Note: Since Nagata teaches the same polymer blend, the reference's polymer blend would inherently be extrudable as recited in the preamble.

In regards to claims 1, 5-7, and 10, Nagata teaches the water-absorbent resin being crosslinked starch-acrylate graft copolymers, acrylate-methacrylate copolymers or methylacrylate-vinyl acetate copolymers, and the thermoplastic resin being ethylene-acrylic acid copolymer (see col. 2, ln. 47-53; col. 3, ln. 32-33). Although Nagata is silent with respect to the thermoplastic resin having a functional group interacting ionically or covalently with the water-absorbent resin, since the reference teaches the same resins, the resins would inherently react with each other in the same way as presently claimed.

Art Unit: 1711

In regards to claims 2 and 32, although Nagata is silent with respect to the melt draw down rate, melt tension, and melt flow rate of the blend; since the reference teaches the same polymer blend as that of the presently claimed invention, Nagata's polymer blend would inherently have the same physical properties.

In regards to claims 3-4, Nagata teaches the high water-absorbent resin being acrylate-methacrylate copolymers, or methylacrylate-vinyl acetate copolymers (see col. 2, ln. 50), whose monomers are monocarboxylic acids, which are water-soluble  $\alpha,\beta$ -ethylenically unsaturated monomers.

In regards to claim 9, Nagata further teaches a mixture of the thermoplastic resins, which include polyethylene or polypropylene (see col. 3, ln. 30-35).

In regards to claims 8 and 11, Nagata teaches the polymer blend composition further comprising a surfactant (see col. 7, ln. 22).

#### ***Contact Information***

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thao T. Tran whose telephone number is 571-272-1080. The examiner can normally be reached on Monday-Friday, from 8:30 a.m. - 5:00 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James Seidleck can be reached on 571-272-1078. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 1711

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

*Thao Tran*

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February 20, 2004